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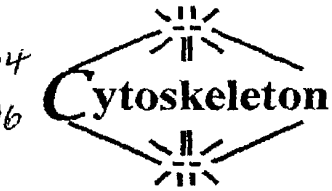

5 pages

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January 1st 2004

Dr. David Lukton
Commissioner of Patents
USPTO
Patent Applications
Washington DC 20231
Tel: 703-308-3213.

Ref: 09/725,030

Dear Dr. David Lukton:

With respect to our previous commincations about the applicability of claiming a compound and a mechanism, I wanted to bring your attention to the attached US patent # 6660767. In the inventors' claims it clearly states that "stabilizing microtubules" is the mechanism to be claimed. Likewise we are claiming that "S-phase arrest" is the mechanism. In addition the inventors clearly claim a compound "coumarin" in addition to this mechanism. Likewise we are claiming a compound "iodine acetamido benzoyl ethyl acetate". In addition the inventors claim "in combination with [eight other] compounds" (claim13) which they have clearly not tested, but your advice was to remove the unknown "other disease targets" from our claims list as unproven ? Finally the aforementioned patent was applied for in 2-1-2001 and approved in 12-9-2003 which is two years and ten months. Currently our application has been pending for three years and three months.

We are looking for parity between our application and other approved patents we hope this extra information will assist this process.

Yours sincerely,

A A Davis

Ashley Davis,

Cytoskeleton Inc.

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

First named inventor: Ashley Davis	
Application no.: 09/725,030 Amendments #5	
Filed: 11/29/00	Examiner: Lukton, D
Title: Anti-S-phase tubulin ligands	Art Group: 1653

ADDITIONAL INFORMATION

Mailed to: Box Amendment, Commissioner for Patents, Mail Stp AF, Arlington VA 22202.

January 1st 2004

Dr. David Lukton
Commissioner of Patents
USPTO
Patent Applications
Washington DC 20231
Tel: 703-308-3213.

Ref: 09/725,030

Dear Dr. David Lukton:

In response to the Office communication dated 6-20-2003 and our reply on 8-20-2003 with respect we submit the additional information.

With respect to our previous communications about the applicability of claiming a compound and a mechanism, I wanted to bring your attention to the attached US patent # 6660767. In the inventors' claims it clearly states that "stabilizing microtubules" is the mechanism to be claimed. Likewise we are claiming that "S-phase arrest" is the mechanism. In addition the inventors clearly claim a compound "coumarin" in addition to this mechanism. Likewise we are claiming a compound "iodine acetamido benzoyl ethyl acetate". In addition the inventors claim "in combination with [eight other] compounds" (claim13) which they have clearly not tested, but your advice was to remove the unknown "other disease targets" from our claims list as unproven, doesn't this constitute an idea ? Finally the aforementioned patent was applied for in 2-1-2001 and approved in 12-9-2003 which is two years and ten months. Currently our application has been pending for three years and three months.

We are looking for parity between our application and other approved patents we hope this extra information will assist this process.

Ashley Davis, V-P, Cytoskeleton Inc. 

USPTO Patent Full-Text and Image Database

United States Patent **6,660,767**
Jacobs , et al. **December 9, 2003**

Coumarin compounds as microtubule stabilizing agents and therapeutic uses thereof

Abstract

Compounds and compositions for stabilizing microtubules are disclosed. Also disclosed are methods of inhibiting, preventing, regulating, modulating, attenuating, stabilizing, or affecting microtubule formation or function. Methods of treating, preventing or inhibiting diseases and disorders associated with microtubule formation, function, or both by administering a microtubule stabilizing agent such as coumarin is also disclosed.

Inventors: **Jacobs; Robert S.** (Santa Barbara, CA); **Wilson; Leslie** (Santa Barbara, CA); **Madari; Hamta** (Santa Barbara, CA)
Assignee: **The Regents of the University of California** (Oakland, CA)
Appl. No.: **060317**
Filed: **February 1, 2002**

Current U.S. Class: **514/457**; 514/28
Intern'l Class: A61K 031/35
Field of Search: 514/457,28

References Cited [Referenced By]

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2002/0165210	Nov., 2002	Agata et al.	514/171.

Abstract.

Primary Examiner: Reamer; James H.
Attorney, Agent or Firm: Jacobson Holman PLLC, Sundby; Suzannah K.

Goverment Interests

STATEMENT REGARDING FEDERALLY SPONSORED RESEARCH OR DEVELOPMENT

This invention was made with Government support under Grant No. R/MP-81, awarded by the National Oceanic & Atmospheric Administration (NOAA) California Sea Grant. The Government has certain rights in this invention.

Parent Case Text

CROSS REFERENCE TO RELATED APPLICATIONS

This application claims the benefit of U.S. Provisional Patent Application No. 60/283,366 filed Apr. 13, 2001, and U.S. Provisional Patent Application No. 60/265,576 filed Feb. 2, 2001, both of which name Robert S. Jacobs, Leslie Wilson, and Hamta Madari as co-inventors and are herein incorporated by reference.

Claims

We claim:

1. A method of stabilizing microtubules in a subject comprising administering at least one coumarin compound or a derivative thereof to the subject.

2. The method of claim 1, wherein the subject is a cell or organism.

3. The method of claim 2, wherein the organism is a mammal.

4. The method of claim 3, wherein the mammal is human.

5. The method of claim 1, wherein the coumarin compound is coumarin, dicoumarol, 7-hydroxycoumarin (umbelliferone), 6,7-dihydroxycoumarin (esculetin), 3,6,7 trihydroxy coumarin, warfarin, or warfarin sodium.

6. A method of modulating microtubules in a subject comprising administering at least one coumarin compound or a derivative thereof to the subject.

7. The method of claim 6, wherein the subject is a cell or organism.

8. The method of claim 7, wherein the organism is a mammal.

9. The method of claim 8, wherein the mammal is human.

10. The method of claim 9, wherein the coumarin compound is coumarin, dicoumarol, 7-hydroxycoumarin (umbelliferone), 6,7-dihydroxycoumarin (esculetin), 3,6,7 trihydroxy coumarin, warfarin, or warfarin sodium.

11. The method of claim 1, wherein the coumarin compound is administered in the form of a pharmaceutical composition which further comprises a pharmaceutically acceptable salt or prodrug thereof, at least one supplementary compound, and a pharmaceutically acceptable excipient.

12. The method of claim 11, wherein the supplementary compound is an antineoplastic agent, an antiproliferative agent, an anti-inflammatory agent, or an anti-fungal agent.

13. The method of claim 11, wherein the supplementary compound is taxol, estramustine, taxotere, vinblastine, vincristine, discodermolide, griseofulvin, or amphotericin B.

14. The method of claim 1, wherein stabilizing the microtubules in the subject treats, prevents, or inhibits a disease or disorder associated with microtubule formation or microtubule function in the subject.

15. The method of claim 14, wherein the disease or disorder is a hyperproliferative or cystic disease.

16. The method of claim 14, wherein the disease or disorder is cancer, Alzheimer's disease, atherosclerosis, restenosis, or gout.

17. The method of claim 1, wherein stabilizing the microtubules modulates the cell cycle of a cell in the subject.

18. The method of claim 1, wherein stabilizing the microtubules treats, prevents, or inhibits cancer in the subject.

19. The method of claim 18, wherein the coumarin compound is not coumarin, 7-hydroxycoumarin, warfarin, or warfarin sodium.

20. The method of claim 1, wherein stabilizing microtubules treats, prevents, or inhibits a disease or disorder associated with microtubule formation or microtubule function in the subject and the coumarin compound has a basic structural formula ##STR7##

for a backbone structure, wherein the benzene ring, the pyrone, or both may further comprise at least one substituent.

21. The method of claim 1, further comprising administering an antineoplastic agent, an antiproliferative agent, an anti-inflammatory agent, or an anti-fungal agent.

22. The method of claim 1, further comprising administering a supplementary compound.

23. The method of claim 22, wherein the supplementary compound is a taxol, estramustine, taxotere, vinblastine, discodermolide, griseofulvin, or amphotericin B.